STATE OF NEW HAMPSHIRE DEPARTMENT OF TRANSPORTATION BUREAU OF HIGHWAY DESIGN

CONFERENCE REPORT

PROJECT: BEDFORD

13527

US 3, Bridge Replacement over F.E.E.T.

DATE OF CONFERENCE: March 27, 2008

LOCATION OF CONFERENCE: BCTV Meeting Room, Bedford

ATTENDED BY: DEPARTMENT OF TRANSPORTATION

Alex Vogt John Butler
Trent Zanes Eric Paddleford

SUBJECT: Public Officials/Public Informational Meeting

NOTES ON CONFERENCE:

Alex Vogt opened the meeting and explained the need to replace the bridge carrying US Route 3 over the F.E. Everett Turnpike. The existing two-span bridge was built in 1955 and measures 150 feet long and 41.5 feet wide. The condition of the bridge is very poor, and needs complete replacement.

The proposed bridge includes two-spans for an overall length of 200 feet. The increased length will accommodate future widening of the F.E. Everett Turnpike. The posted speed is 30 mph thru the project area and changes to 35 mph south of Hawthorne Drive. Alex asked Trent Zanes to discuss the proposed design of the new bridge.

Trent described the project limits on US Route 3 approximately 900 feet north/west of the bridge to the Lowe's/Target drive and 1,800 feet south of the bridge to Hawthorne Drive intersection. The existing bridge includes two 12-foot wide travel lanes, 3-foot wide shoulders, and sidewalks on both sides. The sidewalks end at the bridge approaches and are not connected to existing sidewalk routes.

In order to maintain traffic during construction, the new bridge will be constructed north of the old bridge. Extensive ledge removal will be required for the new abutments. After traffic has been shifted to the new bridge, the old structure will be removed.

The proposed bridge width of 68 feet will be capable of providing five lanes of travel to accommodate for future traffic demands on US Route 3. For the current design period, a three-lane section is proposed southerly from the bridge to Hawthorne Drive. Due to recent development

within the project limits, as well as future commercial expansion, the three-lane section may require some additional minor modifications. The proposed two lanes southbound across the bridge could be merged prior to the bridge. Proposed sidewalks were shown on the western side of US Route 3 from the Lowe's/Target drive to the Hawthorne Drive intersection. Feedback on preferred sidewalk locations were requested.

The profile of the proposed roadway will provide the required minimum clearance of 16.5 feet over the turnpike. The bridge will slope at 1.5% to promote proper storm water runoff. Further drainage design will be performed to determine where swales, closed systems, and potential outlets will be required.

The realignment of US Route 3 will have the greatest impacts to the northeast quadrant of the bridge, where a strip of ROW will need to be acquired. Slope easements will also be necessary. Trent concluded his presentation and Alex introduced Erik Paddleford to discuss environmental issues.

Erik noted that there are no wetlands, historic properties, or floodplain boundaries within the project limits. He described the project review process with the cultural and natural resource agencies. Anyone wishing to become a consulting party to the environmental process could contact him for further details.

Alex reported the estimated construction cost as \$11.5 million. Preliminary engineering and ROW costs would bring the total to \$13.3 million. The exact cost will not be known until the project is fully designed and bid prices are received. The project cost will be 100% funded with Turnpike monies.

A formal public hearing, chaired by a commission appointed by the Governor and Executive Council, will be held in late 2008 or early 2009 to authorize the layout. Further project design and ROW acquisition will occur throughout 2010 and 2011. The project would advertise for construction in fiscal year 2012, with construction expected to take place in 2012 and 2013. Temporary closures of the F.E. Everett Turnpike will be necessary at times to permit blasting of ledge and the setting the steel on the new bridge.

Alex noted that comments regarding the design would be appreciated, and he asked for thoughts regarding proposed sidewalk locations. He stated that sidewalk construction would require a signed maintenance agreement from the Town, as the State does not maintain sidewalks. Alex also solicited comments from utility owners that may desire to include facilities on the bridge. The proposed plan can be viewed on the Department's Web site

Discussion:

It was asked when the Airport Access Road would be open to traffic, and what affect that would have on this project. Alex responded that the Airport Access Road is currently envisioned to be open at the end of 2013, and this project would be completed in 2013. He noted that the Airport Access Road and its new interchange with US 3 is not expected to substantially change the volume of traffic on US 3 at the location of this bridge project.

Two comments were received regarding the sidewalk issue. One person recommended that the sidewalk be constructed on the east side of US 3 due to the residential development on

Hawthorne Drive. Another person recommended sidewalks on both sides of the road, noting that there are restaurants in front of the Lowe's/Target development.

It was asked if the property to the east of the bridge between the shifted US 3 alignment and the existing US 3 alignment could be made available to the Town. Alex responded that this could be considered.

It was asked if there would be any property acquisition to the west of the bridge. Alex responded that no property acquisition is anticipated at this time, but a drainage easement may be necessary. It was noted that a development opposite Lowe's/Target is in the early stages of design, and is envisioned to be the fourth leg of the intersection. A copy of the proposed development plan was given to the Department. A northbound right turn lane on US 3 may be constructed by the developer. A comment was made that the drainage that outlets onto the property has become more of a problem since the construction of the Lowe's/Target development. It was asked that a careful review of the drainage be done to insure that this problem is not exacerbated by the project.

A comment was made that merging the two southbound lanes to one on the horizontal curve is not a good location, and it was suggested that the two lanes be continued all the way to the Hawthorne Drive intersection. Alex noted that doing so would require extending the work for several hundred feet to the south of the intersection in order to safely merge the two lanes back to one. The basic intent of the project is to replace the bridge, and minimize the amount of roadway approach work on either end. Alex noted that the location of the southbound lane drop is an issue that's still being reviewed. Another person suggested that the two lanes could simply line up with the two existing lanes at the intersection, however, Alex noted that would result in an undesirable condition where drivers could get "trapped" in the lane that becomes a left turn lane.

It was noted that there is a large mall that is proposed in Merrimack, and this may increase traffic on US 3 in the bridge area. Alex discussed the traffic volume forecasting process used for the project. Although large individual developments are not specifically accounted for, the growth projections used will account for the anticipated regional growth over the 20 year design horizon that is used. Development in Merrimack would not have significant traffic impact along this section of US Route 3 as the Manchester Airport Access Road will provide access to the Turnpike from US Route 3 near the Bedford/Merrimack town line.

Submitted by:

John D. Butler, P.E. Preliminary Design Supervisor

NOTED BY: A. Vogt, T. Zanes

cc: B. Cass Bill Lambert (Traffic)
A. Vogt Pam Mitchell (Dist. 5)

T. Zanes Harvey Goodwin (Turnpikes)E. Paddleford Steve Liakos (Bridge Design)

Town of Bedford